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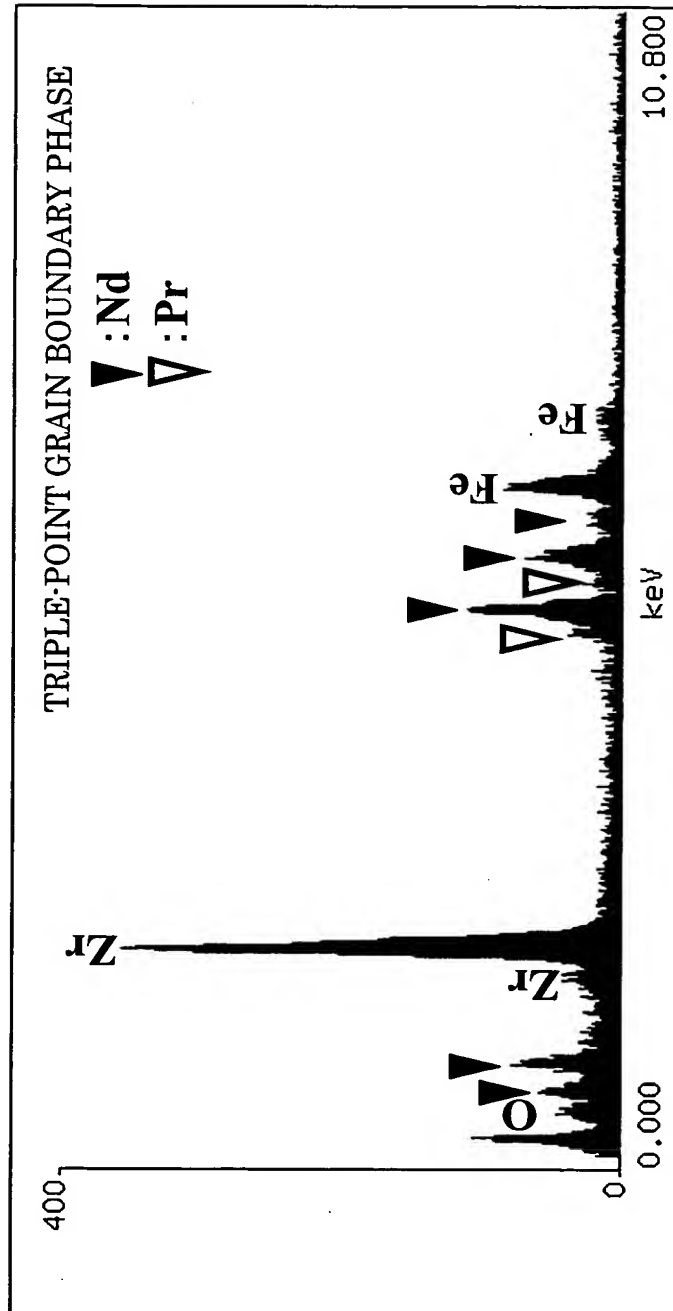
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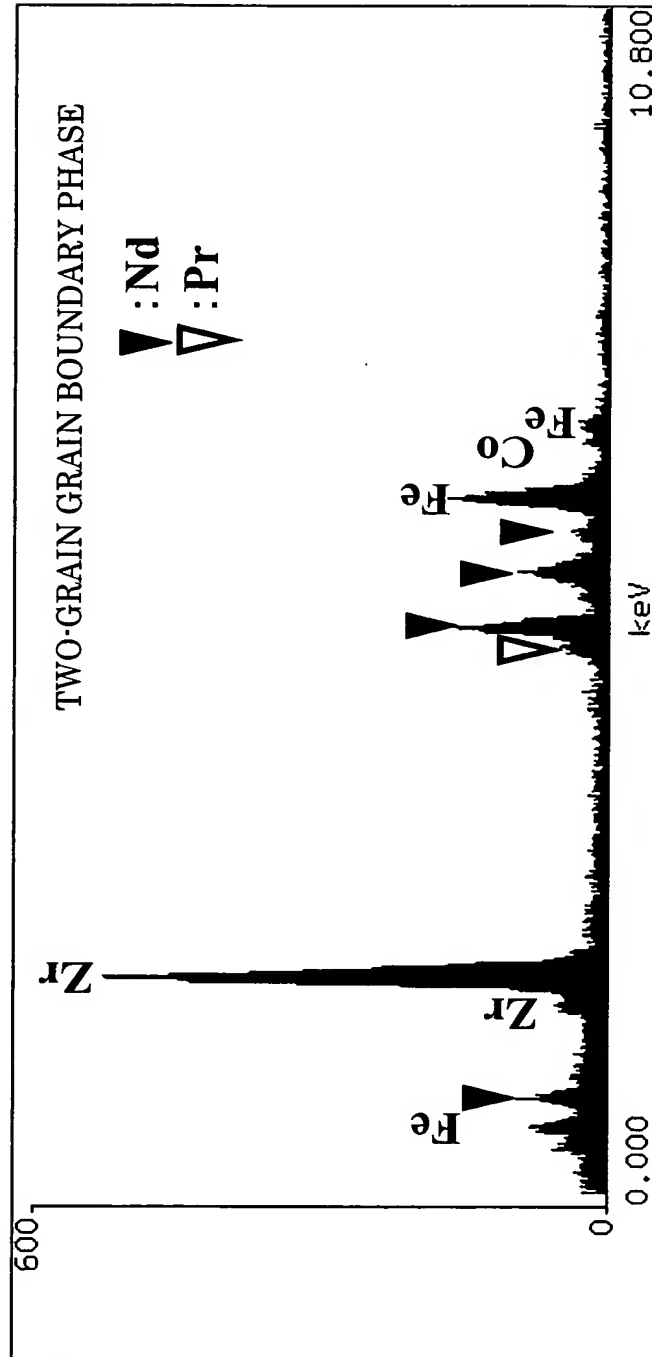
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FIG. 1



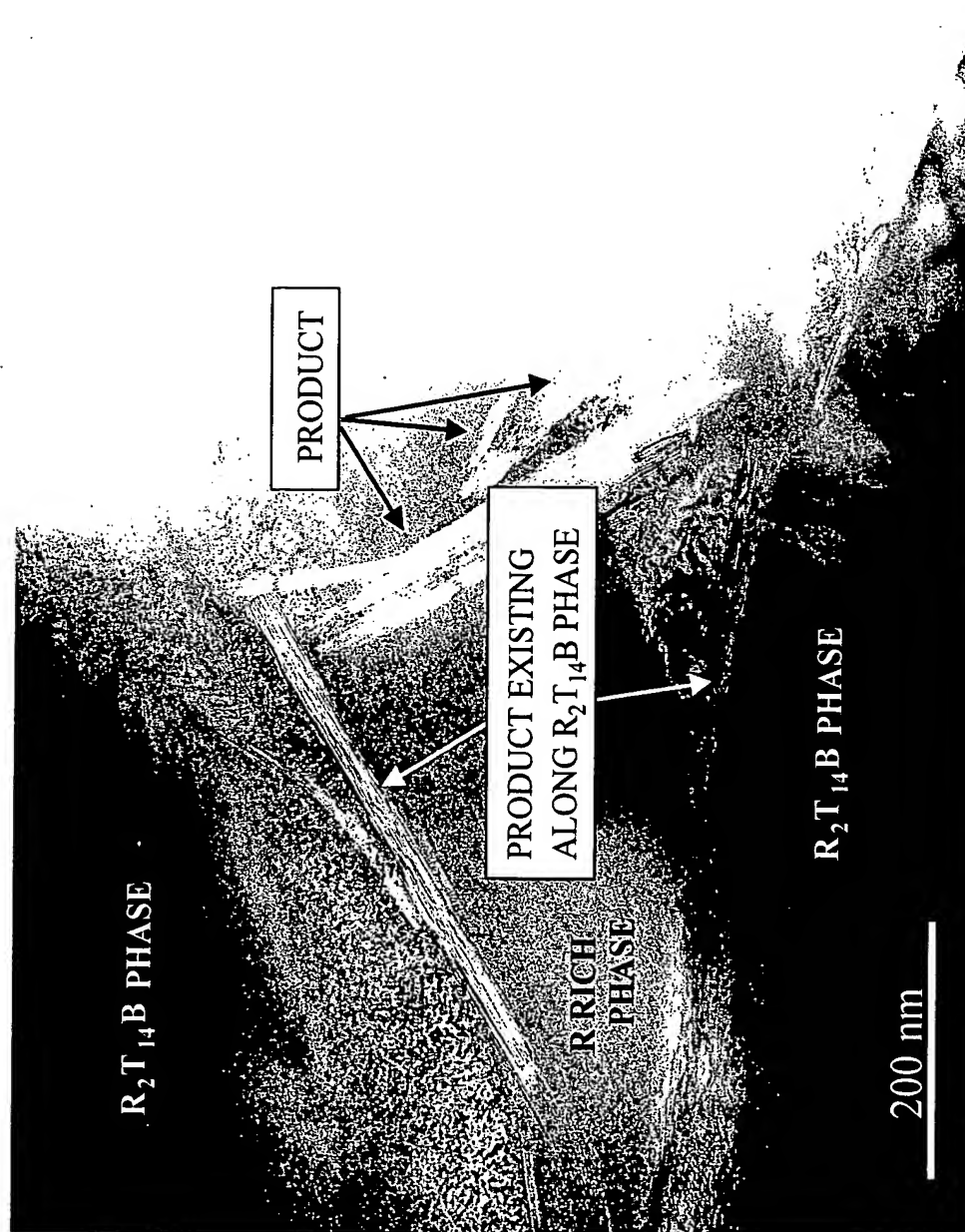
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FIG. 2



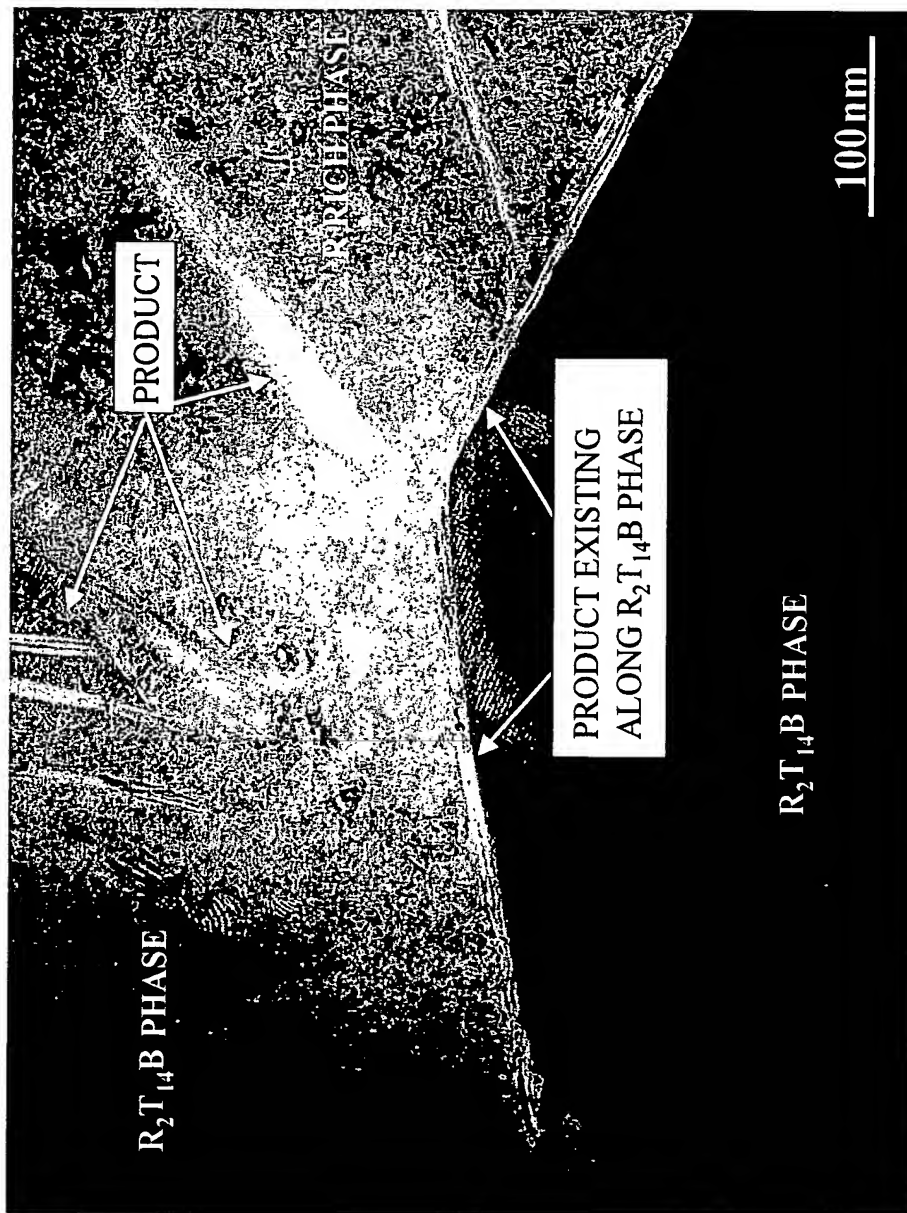
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FIG. 3



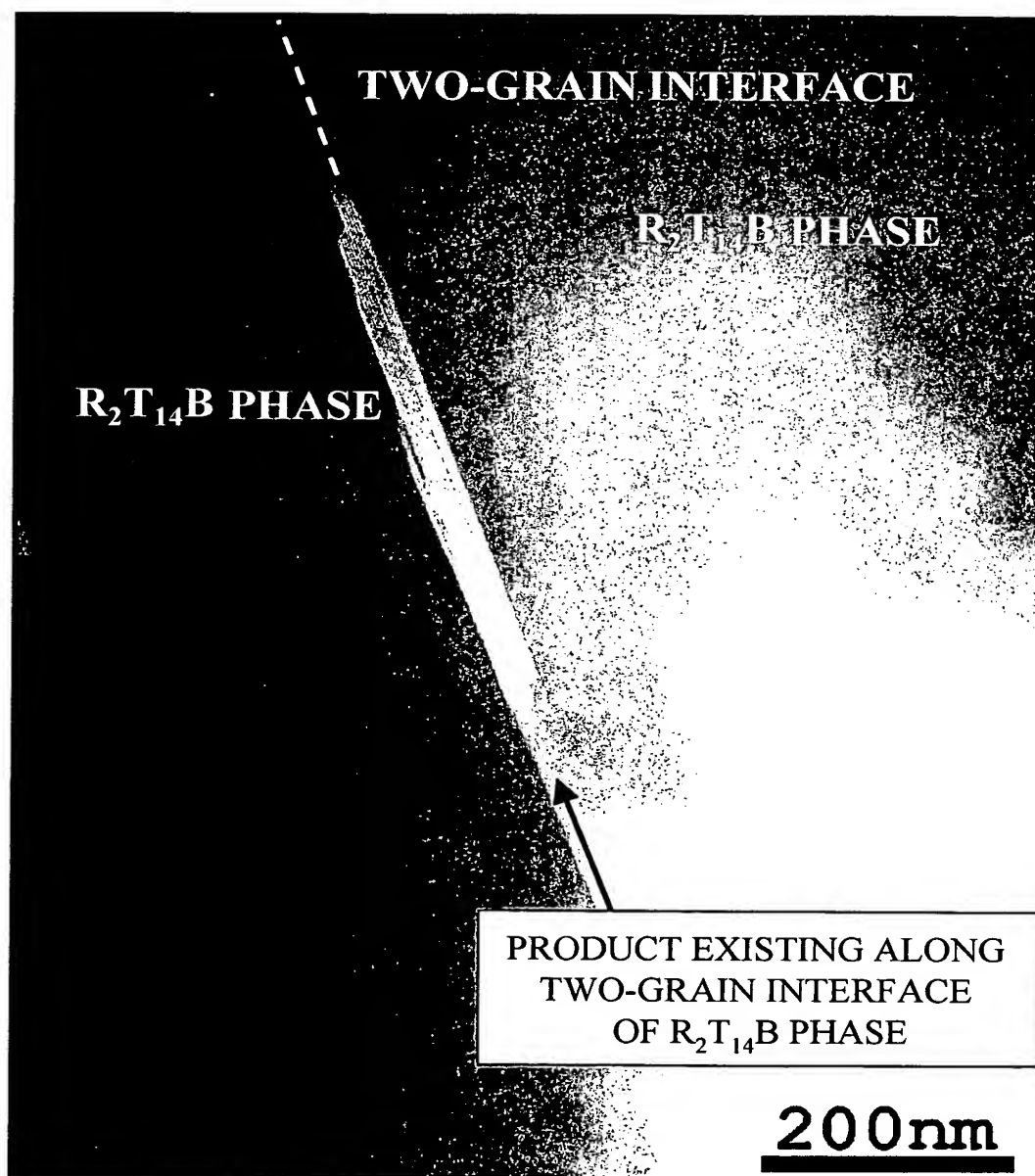
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FIG. 4



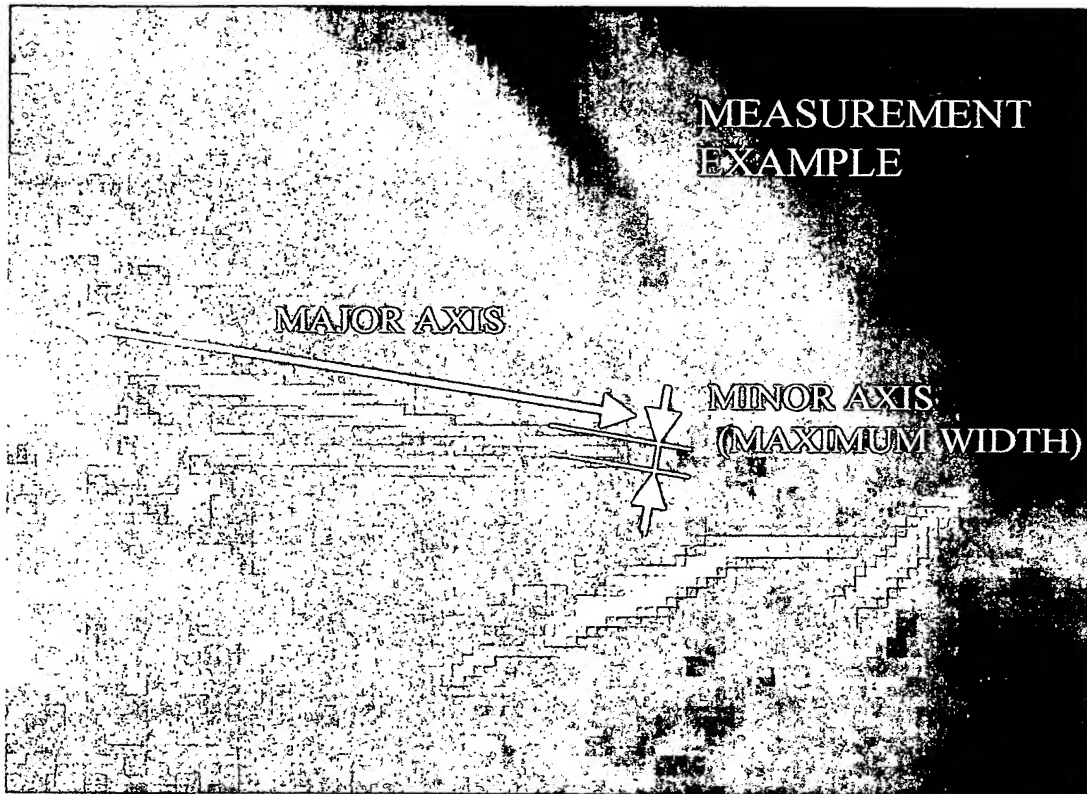
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FIG. 5



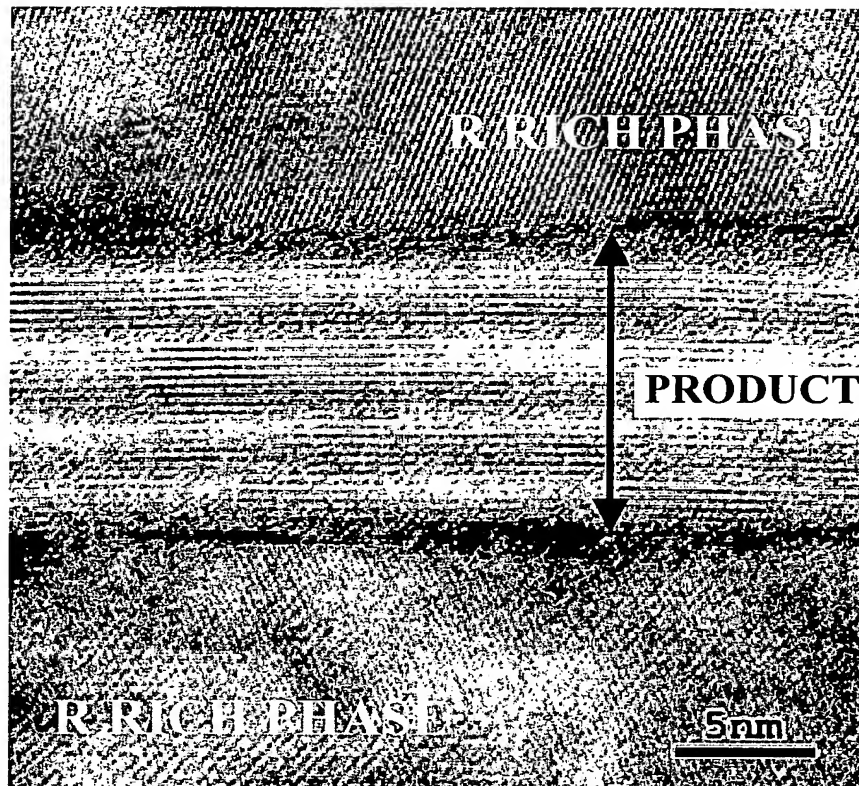
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FIG. 6



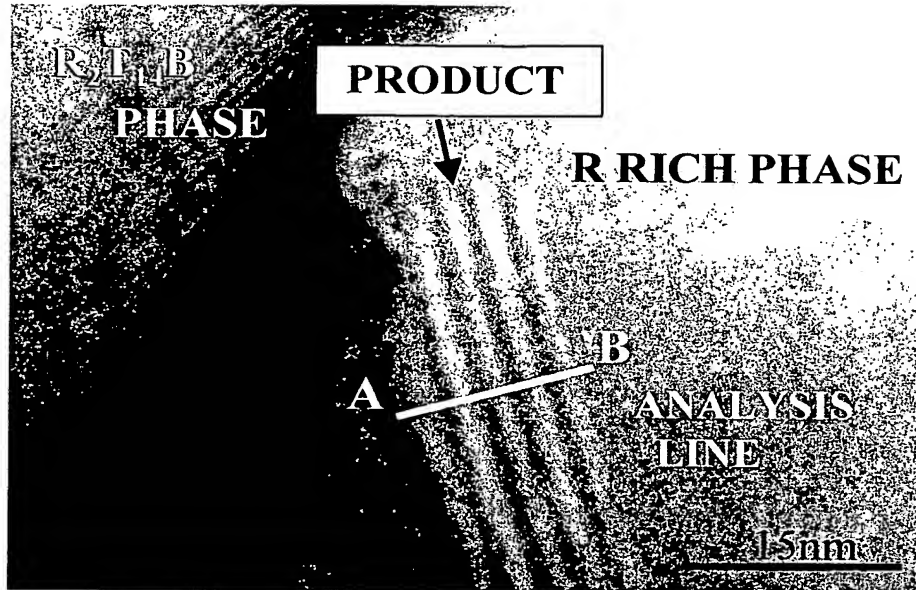
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FIG. 7



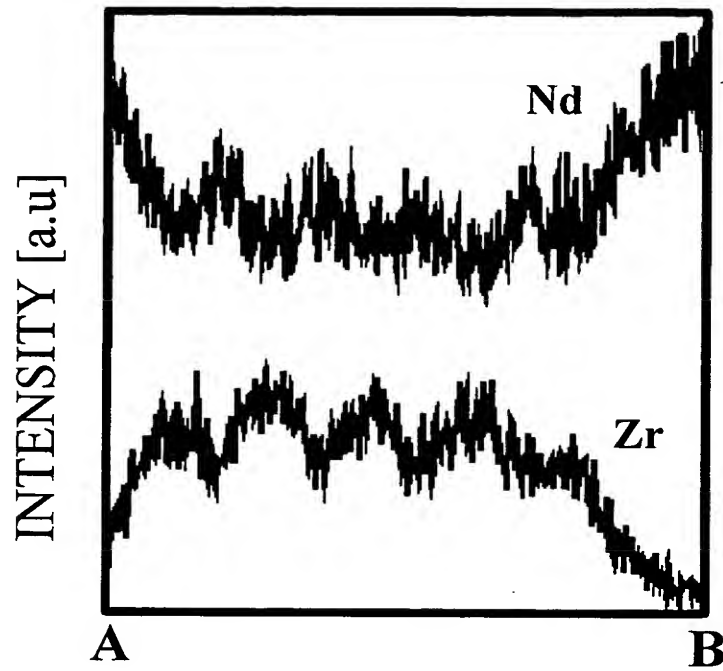
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FIG. 8



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FIG. 9



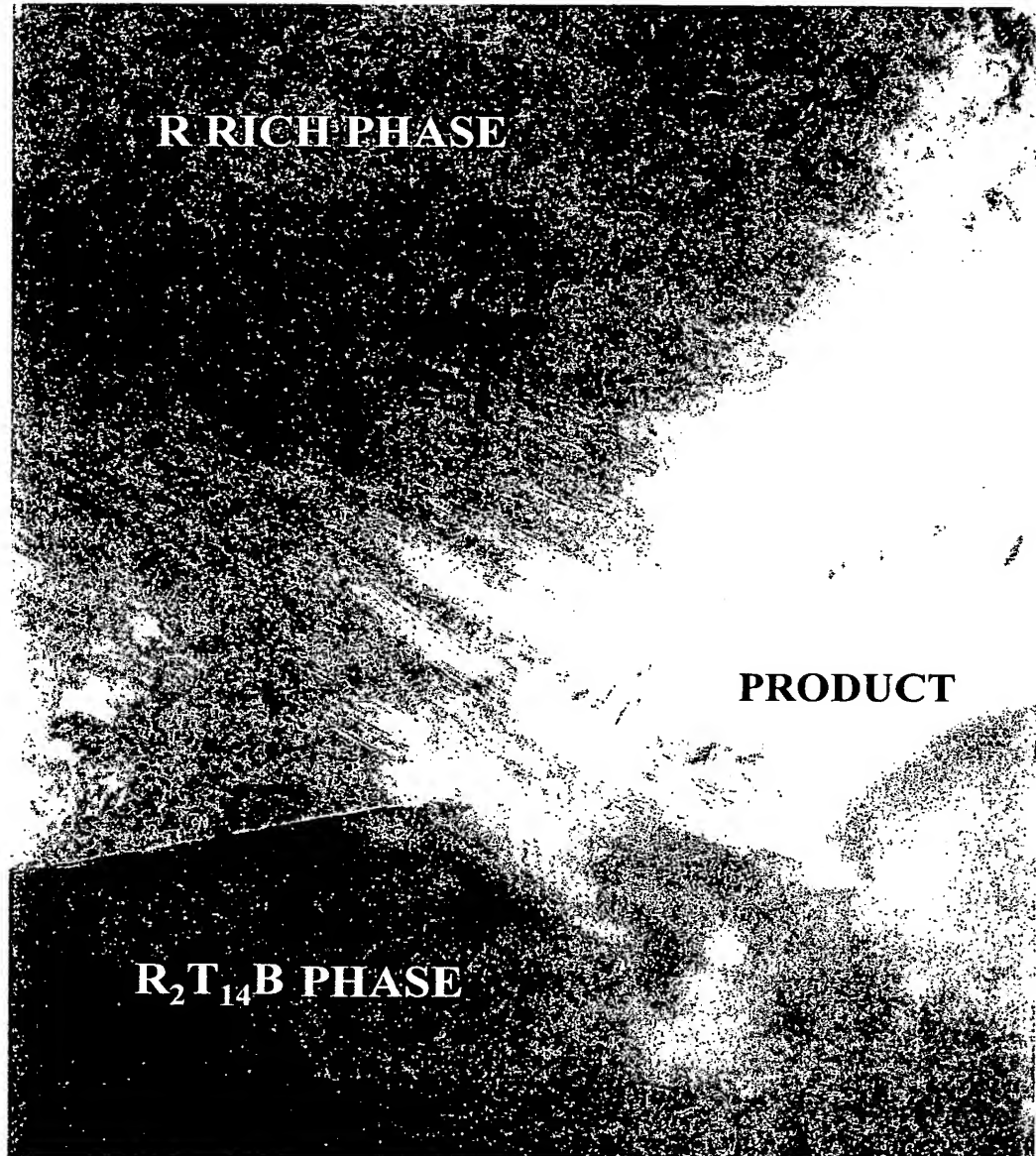
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FIG. 10

TYPE		Nd (wt%)	Pr (wt%)	Dy (wt%)	Co (wt%)	Cu (wt%)	Al (wt%)	B (wt%)	Zr (wt%)	Fe
A	LOW R ALLOY	23.6	6.0	0.3	—	0.05	0.23	1.1	0.11	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	—	—	bal.
	COMPOSITION OF SINTERED BODY	25.0	5.3	0.3	0.5	0.05	0.23	1.0	0.10	bal.
B	LOW R ALLOY	23.6	6.0	0.3	—	0.05	0.23	1.1	—	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	0.5	2.0	bal.
	COMPOSITION OF SINTERED BODY	25.0	5.3	0.3	0.5	0.05	0.23	1.1	0.10	bal.
C	LOW R ALLOY	23.6	6.0	0.3	—	0.05	0.23	1.1	—	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	—	—	bal.
	COMPOSITION OF SINTERED BODY	25.0	5.3	0.3	0.5	0.05	0.23	1.0	—	bal.

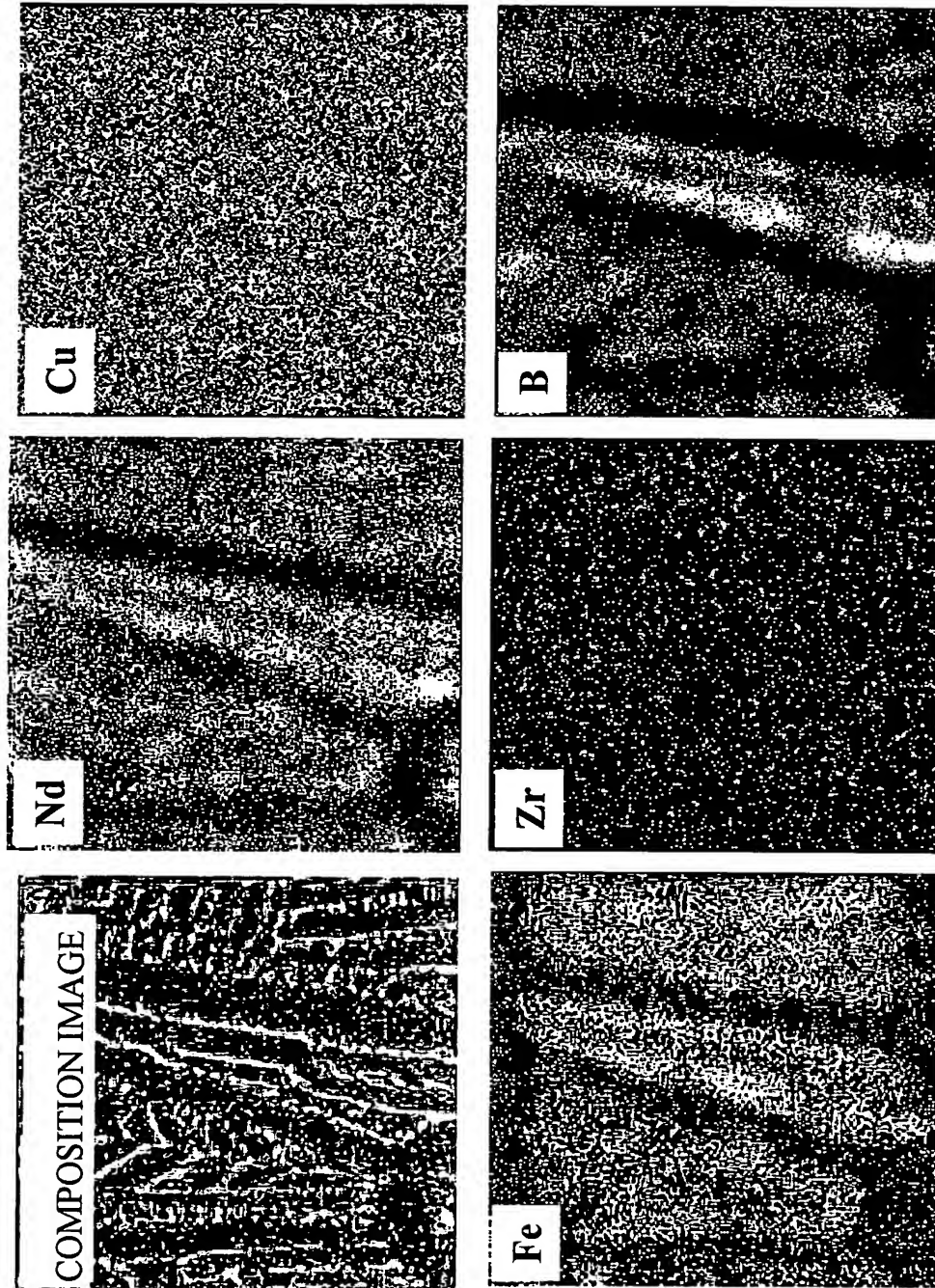
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FIG. 11



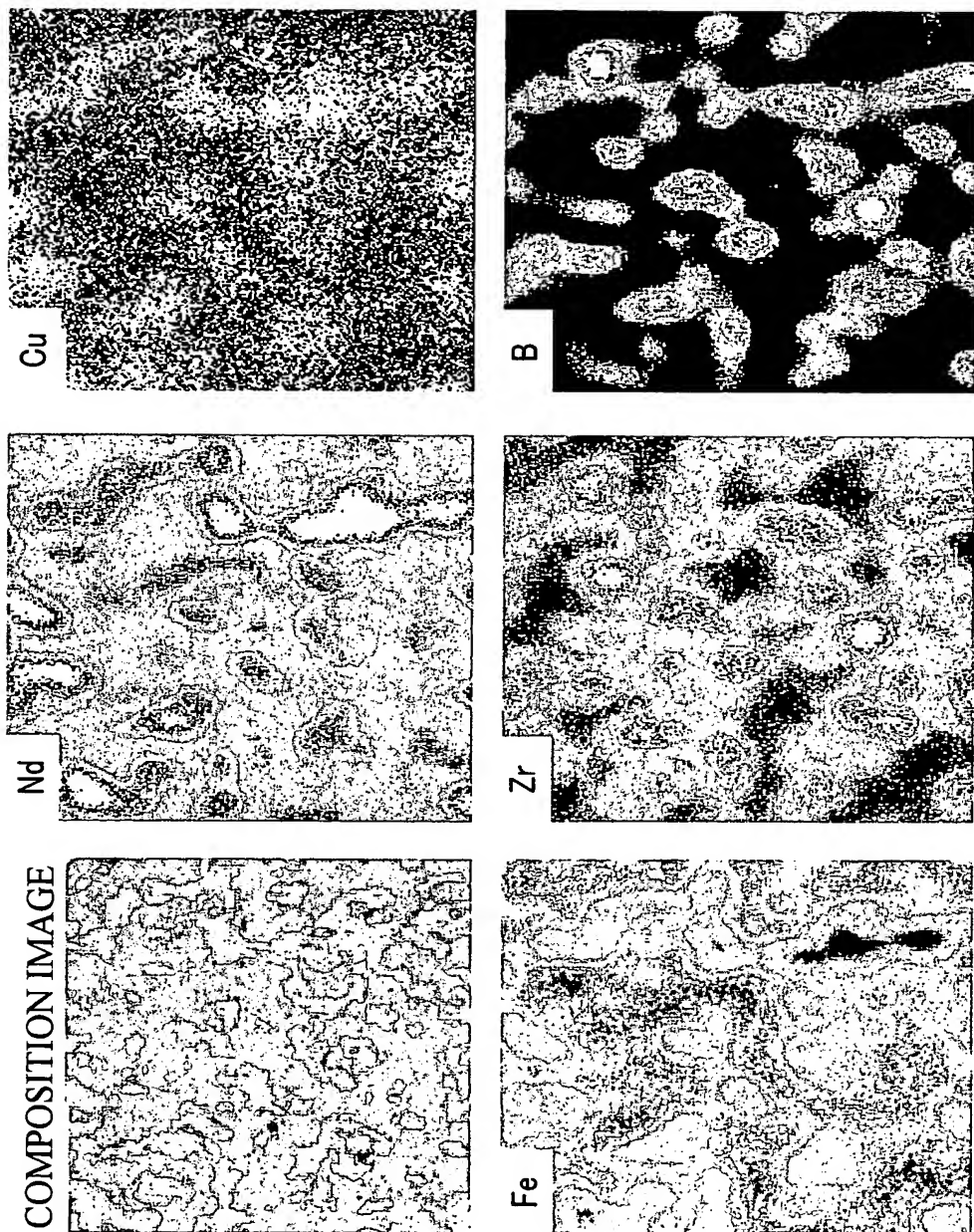
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FIG. 12



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FIG. 13



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FIG. 14

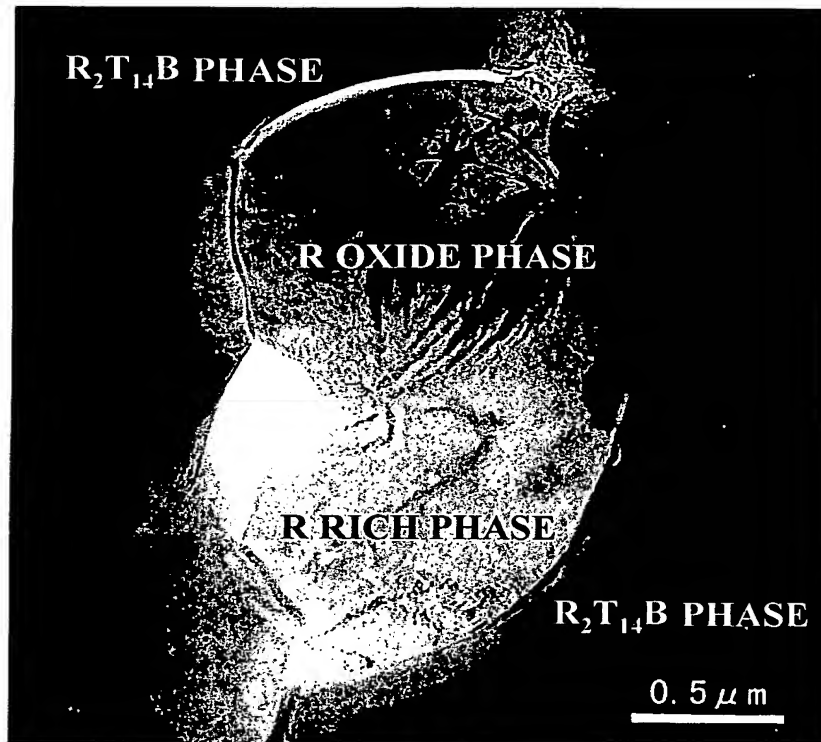
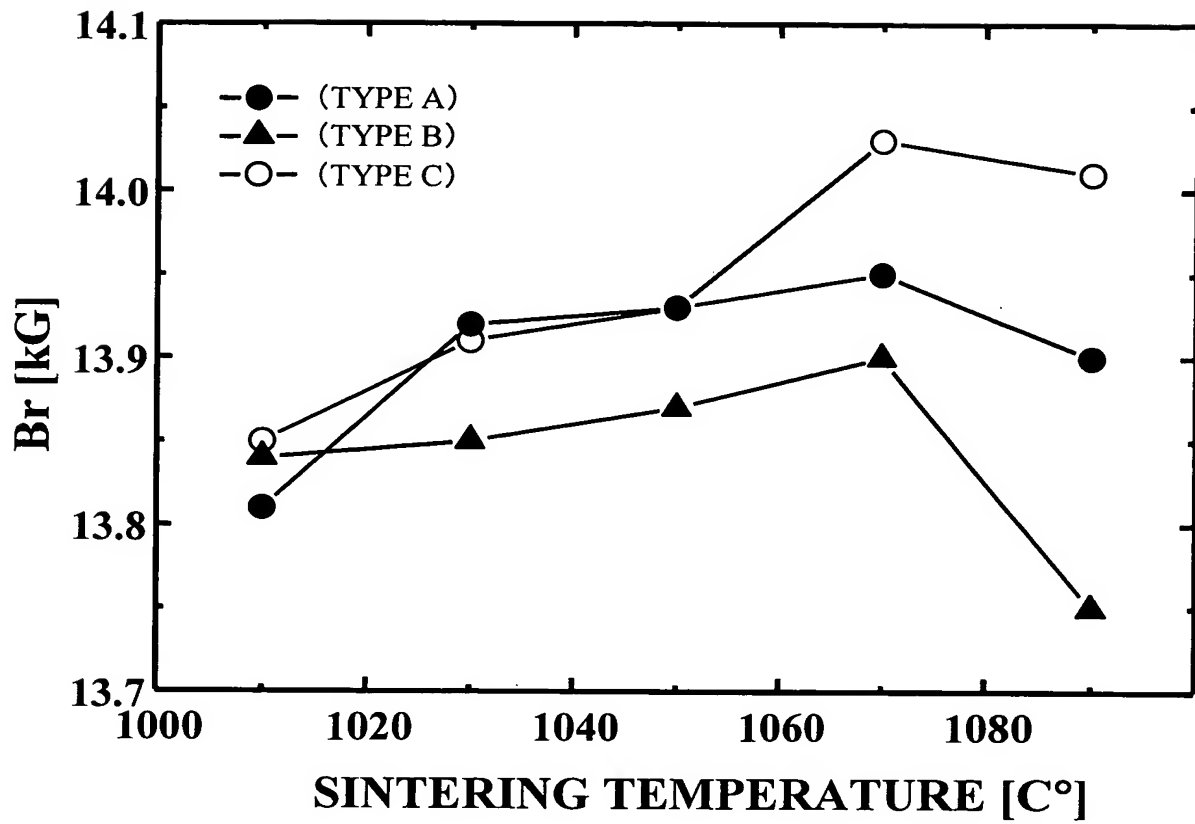


FIG. 15

TYPE	Zr ADDING METHOD	Zr ADDITIVE AMOUNT [wt%]	O ₂ [ppm]	N ₂ [ppm]	SIZE OF PRODUCT (AVERAGE)			SINTERING TEMPERATURE [°C]	Br [kG]	HcJ [kOe]	Hk/HcJ [%]
					MAJOR AXIS [nm]	MINOR AXIS [nm]	AXIS RATIO				
A	LOW R ALLOYS	0.1	670	350	310	15	22.7	1010	13.81	12.56	86.3
								1030	13.92	13.26	96.1
								1050	13.93	13.52	97.0
								1070	13.95	13.62	96.3
								1090	13.90	13.42	96.0
B	HIGH R ALLOYS	0.1	850	300	166	15	11.2	1010	13.84	12.24	86.3
								1030	13.85	12.34	88.7
								1050	13.87	13.20	91.5
								1070	13.90	13.18	90.1
								1090	13.75	12.56	75.3
C	—	0	720	320	NO PRODUCT GENERATED			1010	13.85	11.87	84.2
								1030	13.91	12.22	85.6
								1050	13.93	13.15	88.7
								1070	14.03	12.92	51.7
								1090	14.01	12.13	39.1

FIG. 16



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FIG. 17

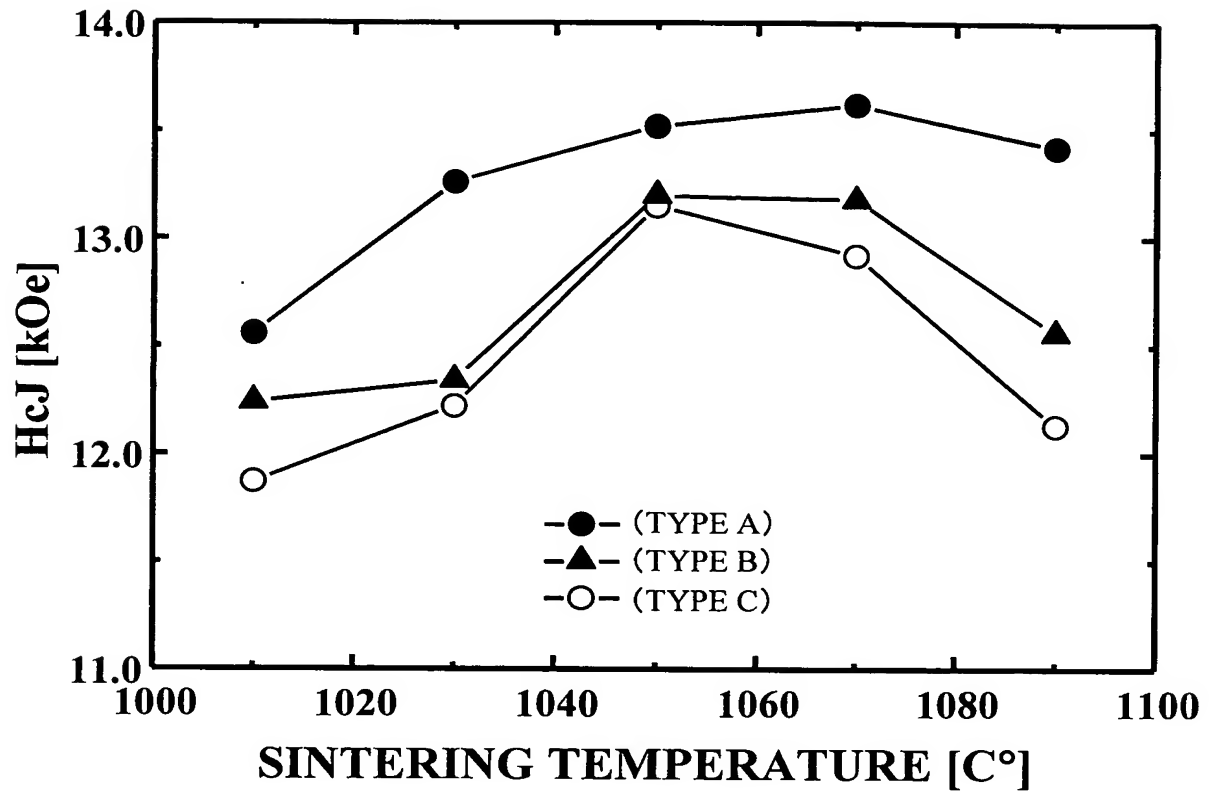


FIG. 18

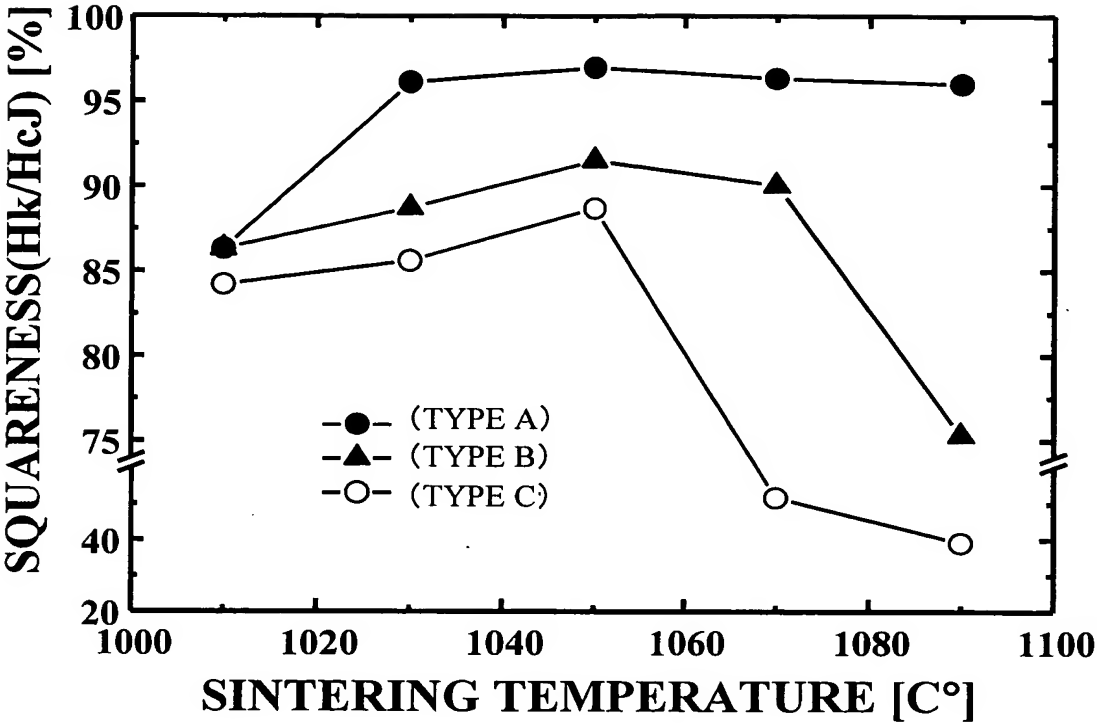


FIG. 19

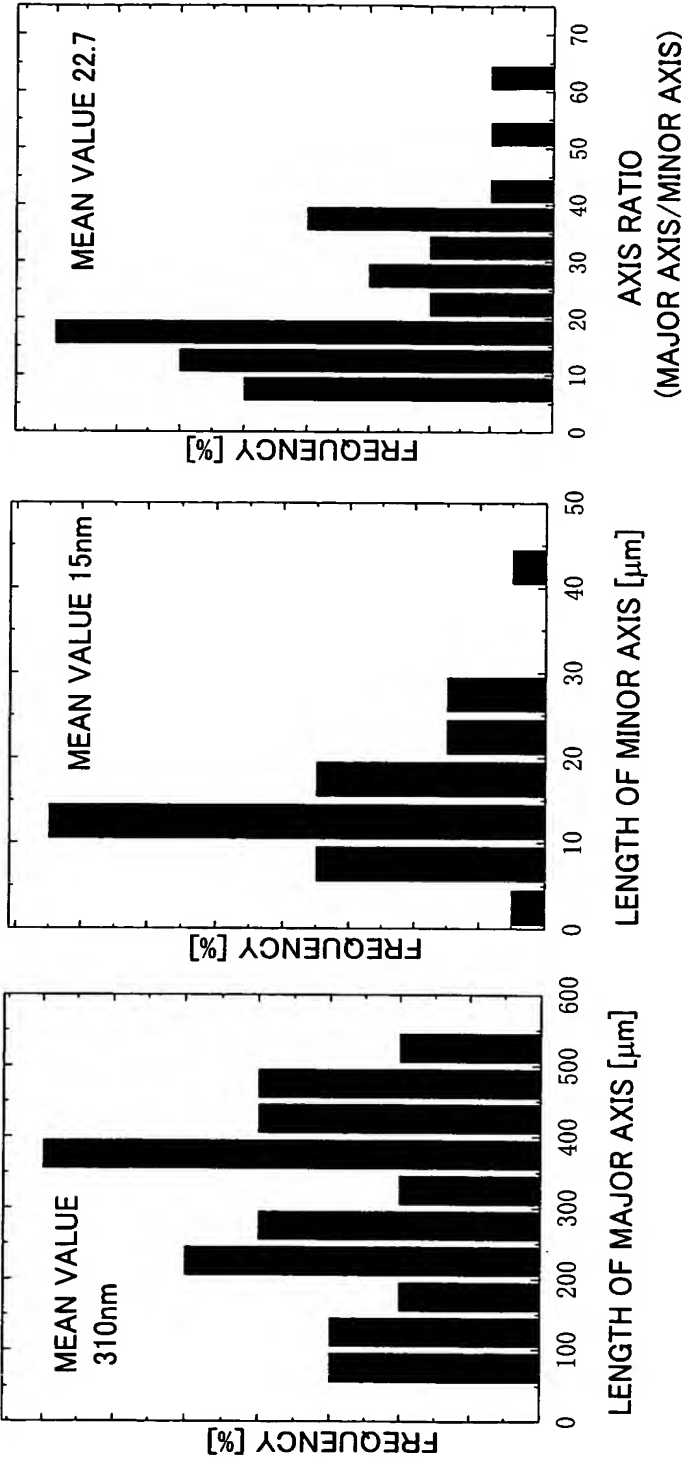
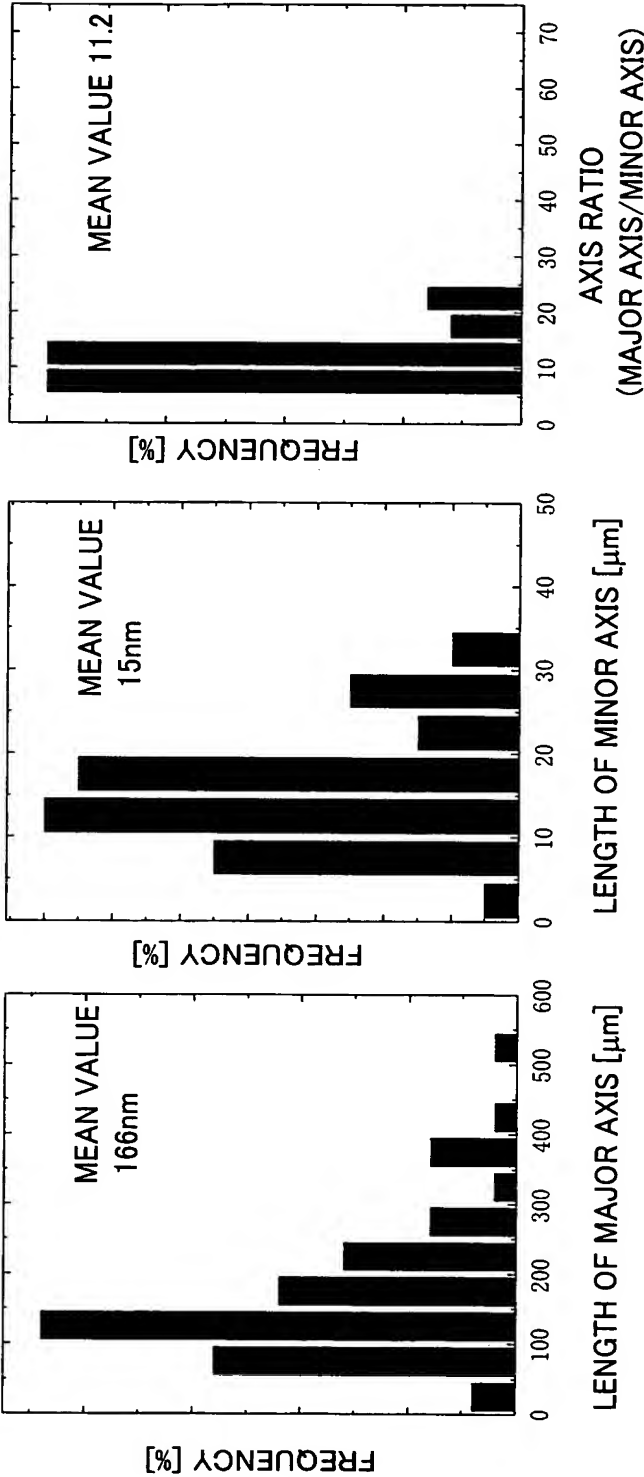


FIG. 20



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FIG. 21

TYPE		Nd (wt%)	Pr (wt%)	Dy (wt%)	Co (wt%)	Cu (wt%)	Al (wt%)	B (wt%)	Zr (wt%)	Fe
D	LOW R ALLOY	23.6	6.0	0.3	—	0.05	0.23	1.1	0.12	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	—	—	bal.
	COMPOSITION OF SINTERED BODY	25.0	5.3	0.3	0.5	0.05	0.23	1.0	0.11	bal.
E	LOW R ALLOY	23.6	5.7	0.4	—	0.05	0.18	1.1	0.15	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	—	—	bal.
	COMPOSITION OF SINTERED BODY	25.0	5.1	0.4	0.5	0.05	0.19	1.0	0.15	bal.
F	LOW R ALLOY	22.5	6.2	1.2	—	0.05	0.23	1.1	0.20	bal.
	HIGH R ALLOY	40.6	—	—	5.0	0.05	0.23	—	—	bal.
	COMPOSITION OF SINTERED BODY	24.0	5.6	1.1	0.5	0.05	0.23	1.0	0.18	bal.
G	LOW R ALLOY	22.7	5.0	1.5	—	0.05	0.23	1.1	0.16	bal.
	HIGH R ALLOY	34.3	—	6.0	5.0	0.05	0.15	—	—	bal.
	COMPOSITION OF SINTERED BODY	23.9	4.5	2.0	0.5	0.05	0.22	1.0	0.15	bal.

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FIG. 22

TYPE	O ₂ [ppm]	N ₂ [ppm]	SINTERING TEMPERATURE [°C]	Br [kG]	HcJ [kOe]	Hk/HcJ [%]	Br+0.1 x HcJ [DIMENSIONLESS]	SIZE OF PRODUCT (AVERAGE)		
								MAJOR AXIS [nm]	MINOR AXIS [nm]	AXIS RATIO
D	620	440	1010	14.35	10.83	88.6	15.4	280	13	18.8
			1030	14.36	14.31	95.0	15.8			
			1050	14.44	14.28	97.0	15.9			
			1070	14.44	13.15	95.2	15.8			
			1090	14.52	10.96	44.0	14.9			
E	580	380	1010	14.33	11.55	88.0	15.5	330	15	23.1
			1030	14.40	14.37	95.6	15.8			
			1050	14.30	14.41	96.4	15.9			
			1070	14.43	14.05	97.5	15.8			
			1090	14.38	13.22	96.0	15.7			
F	870	420	1010	14.18	13.51	87.3	15.5	410	18	24.4
			1030	14.27	15.37	95.3	15.7			
			1050	14.28	15.42	96.1	15.8			
			1070	14.28	15.40	98.2	15.8			
			1090	14.28	15.31	97.9	15.7			
G	550	360	1010	13.90	15.31	95.6	15.4	300	15	21.9
			1030	13.90	17.07	97.8	15.6			
			1050	13.90	17.18	97.9	15.6			
			1070	13.91	17.22	97.8	15.6			
			1090	13.92	16.83	72.1	15.6			

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FIG. 23

TYPE		Nd [wt%]	Pr [wt%]	Dy [wt%]	Co [wt%]	Cu [wt%]	Al [wt%]	B [wt%]	Zr [wt%]	O ₂ [ppm]	N ₂ [ppm]	Fe
H	LOW R ALLOY	27.9	-	0.1	-	0.03	0.05	1.1	0.08	-	-	bal.
	HIGH R ALLOY	35.1	-	-	2.0	0.03	0.05	-	-	-	-	bal.
	COMPOSITION OF SINTERED BODY	28.3	-	0.1	0.2	0.03	0.05	1.0	0.07	720	360	bal.
I	LOW R ALLOY	23.7	6.0	0.2	-	0.30	0.25	1.6	0.30	-	-	bal.
	HIGH R ALLOY	40.6	-	-	20.0	0.30	0.25	-	-	-	-	bal.
	COMPOSITION OF SINTERED BODY	26.9	4.8	0.2	4.0	0.30	0.25	1.3	0.24	980	450	bal.

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FIG. 24

TYPE	Br [kG]	HcJ [kOe]	Hk/HcJ [%]
H	14.62	13.10	98.0
I	13.88	15.30	96.0
D	14.44	13.15	95.2
E	14.43	14.05	97.5
F	14.28	15.40	98.2
G	13.91	17.22	97.8